In [77]:

```
from sklearn.neural_network import MLPClassifier
```

In [78]:

```
X = [[0, 0],[0, 1],[1, 0],[1, 1]]
```

In [79]:

```
y = [0, 1, 1, 0]
```

In [95]:

```
clf = MLPClassifier(hidden_layer_sizes=(4, 2),solver='lbfgs', alpha=1e-5,
max_iter=5000, random_state=1)
```

In [96]:

```
clf.fit(X,y)
```

Out[96]:

```
MLPClassifier(activation='relu', alpha=1e-05, batch_size='auto', beta_1=0.
9,
       beta_2=0.999, early_stopping=False, epsilon=1e-08,
       hidden_layer_sizes=(4, 2), learning_rate='constant',
       learning_rate_init=0.001, max_iter=5000, momentum=0.9,
       nesterovs_momentum=True, power_t=0.5, random_state=1, shuffle=True,
       solver='lbfgs', tol=0.0001, validation_fraction=0.1, verbose=False,
       warm_start=False)
```

In [97]:

```
clf.score(X,y)
```

Out[97]:

```
1.0
```

In [98]:

```
clf.predict(X)
```

Out[98]:

```
array([0, 1, 1, 0])
```

In [ ]:

In [ ]: